IN THE CLAIMS

Amendments To The Claims:

This listing of claims will replace all prior versions, and listings, of claims in the application:

Listing of Claims:

1. (Currently amended) A control apparatus for an electric power steering system, which controls a motor for applying assist steering torque to a steering line of a vehicle at least according to steering torque signal of the steering line detected by a steering torque sensor, vehicle velocity signal detected by a vehicle velocity sensor and motor current signal detected by a motor current detector, the control apparatus comprising:

a target current controller operational to set ~~for setting~~ target current signal for driving the motor according to the steering torque signal;

a deviation calculator operational to compute ~~for computing~~ a deviation between the target current and motor current signals;

a deviation adjuster operational to adjust ~~for adjusting~~ the deviation with a variable gain that is determined by ~~according to~~ the vehicle velocity signal;

a proportional element operational to execute ~~for executing~~ proportional control for the motor according to the deviation;

an integral element operational to execute ~~for executing~~ integral control for the motor according to the deviation; and

a gain adjuster operational to increase ~~for adjusting~~ the variable gain according to a differential of the steering torque signal.

2. (Currently amended) A control apparatus according to claim1 wherein the gain adjuster is operational ~~adapted~~ to increase ~~adjust~~ the gain according to the differential of steering torque when the differential reaches equal to or greater than a predetermined value.

3. (Currently amended) A method for controlling an electric power steering system, which controls a motor for applying assist steering torque to a steering line of a vehicle at least according to steering torque signal of the steering line detected by a steering torque sensor, vehicle velocity signal detected by a vehicle velocity sensor and motor current signal detected by a motor current detector, the method comprising the steps of:

setting target current signal for driving the motor according to the steering torque signal;

computing a deviation between the target current and motor current signals;

adjusting the deviation with a variable gain that is determined by ~~according to~~ the vehicle velocity signal;

executing proportional control for the motor according to the deviation;

executing integral control for the motor according to the deviation; and

~~adjusting~~ increasing the variable gain according to a differential of the steering torque signal.